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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|---|---------------|----------------------|-------------------------|------------------|
| 09/107,237 | 06/30/1998 | ALAN HERROD | SYM-0625 | 7741 |
| 75 | 90 04/06/2004 | | EXAM | INER |
| Kennenth D' Alessandro | | | LAO, SUE X | |
| Sierra Patent Group, Ltd P.O. Box 6149 | | | ART UNIT | PAPER NUMBER |
| Stateline,, NE 89449 | | | 2126 | 22 |
| | | | DATE MAILED: 04/06/2004 | • |

Please find below and/or attached an Office communication concerning this application or proceeding.

| Office Action Summary | | Application N | Applicant(s) | | | |
|---|--|---|--|--|--|--|
| | | 09/107,237 | HERROD ET AL. | | | |
| | | Examiner | Art Unit | | | |
| | | S. Lao | 2126 | | | |
| | The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply | | | | | |
| THE N - Exten after: - If the - If NO - Failur - Any re | ORTENED STATUTORY PERIOD FOR REPLY MAILING DATE OF THIS COMMUNICATION. Isions of time may be available under the provisions of 37 CFR 1.13 SIX (6) MONTHS from the mailing date of this communication. Period for reply specified above is less than thirty (30) days, a reply period for reply is specified above, the maximum statutory period we to reply within the set or extended period for reply will, by statute, aply received by the Office later than three months after the mailing dipatent term adjustment. See 37 CFR 1.704(b). | 66(a). In no event, however, may a reply be tin within the statutory minimum of thirty (30) day fill apply and will expire SIX (6) MONTHS from cause the application to become ABANDONE | nely filed s will be considered timely. the mailing date of this communication. D (35 U.S.C. § 133). | | | |
| 1)⊠ | Responsive to communication(s) filed on 21 J | anuary 2004 . | | | | |
| 2a)⊠ | This action is FINAL . 2b)☐ Thi | s action is non-final. | | | | |
| 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213. Disposition of Claims | | | | | | |
| 4)🖾 | Claim(s) 1-16 and 33-48 is/are pending in the | application. | | | | |
| • | 4a) Of the above claim(s) is/are withdrawn from consideration. | | | | | |
| 5) | 5) Claim(s) is/are allowed. | | | | | |
| 6)⊠ | 6)⊠ Claim(s) <u>1-3,7,10-13,16,33-35,39,42-45 and 48</u> is/are rejected. | | | | | |
| 7)🖂 | | | | | | |
| 8) Claim(s) are subject to restriction and/or election requirement. Application Papers | | | | | | |
| 9)[] 1 | The specification is objected to by the Examiner | | | | | |
| 10) ☐ The drawing(s) filed on is/are: a) ☐ accepted or b) ☐ objected to by the Examiner. | | | | | | |
| Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a). | | | | | | |
| 11) The proposed drawing correction filed on is: a) approved b) disapproved by the Examiner. | | | | | | |
| If approved, corrected drawings are required in reply to this Office action. | | | | | | |
| 12) The oath or declaration is objected to by the Examiner. | | | | | | |
| Priority u | nder 35 U.S.C. §§ 119 and 120 | | | | | |
| 13) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). | | | | | | |
| a) All b) Some * c) None of: | | | | | | |
| | 1. Certified copies of the priority documents have been received. | | | | | |
| | 2. Certified copies of the priority documents have been received in Application No | | | | | |
| 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)). * See the attached detailed Office action for a list of the certified copies not received. | | | | | | |
| 14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application). | | | | | | |
| | The translation of the foreign language procedures the constitution of the foreign language procedures the constitution of the foreign language procedures the constitution of the constitution of the foreign language procedures the constitution of the | · · | | | | |
| Attachment | | ••• | | | | |
| 2) 🔲 Notice | e of References Cited (PTO-892) e of Draftsperson's Patent Drawing Review (PTO-948) nation Disclosure Statement(s) (PTO-1449) Paper No(s) | 5) Notice of Informal F | r (PTO-413) Paper No(s) Patent Application (PTO-152) | | | |

Art Unit: 2126

DETAILED ACTION

- 1. Claims 1-16 and 33-48 are pending. This action is in response to the remarks filed 1/21/2004.
- 2. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.
- 3. Claims 1-3, 7, 10-13, 16, 33-35, 39, 42-45 and 48 are rejected under 35 U.S.C. 103(a) as being unpatentable over Herrod et al (U S Pat. 5,604,516) in view of Klein et al (U S Pat. 6.507,864).

As to claim 1, Herrod teaches a method for transferring data (data) from a bar code reader (bar code scanning module 8) to a software application (form-based GUI application) having one or more data field (forms such as 7), including the steps of:

storing (scanner interface 22 which includes scanner interface buffer (col. 16, lines 54-60)) data (data) from a bar code reader (bar code scanning module 8) in an entity (scan-aware customer control 32 including fields to hold data) (fig. 2);

storing (store .Action properties as part of the control) identification information regarding the bar code reader (.Action property SOURCE_SCANNER set to identify the bar code reader as data input source) together with the data (data) in the entity (store as part of the control); [col. 11, line 50 - col. 12, line 30, lines 56-64; col. 13, lines 33-37];

transferring the entity to the software application (data entry into GUI application); associating the entity with a data field (form 7 including customer controls) in the software application based on the identification information (provide bar code entry to associated control field 30). See col. 1, lines 25-49; col. 4, line 22-37; col. 4, line 66 - col. 6, line 24.

Herrod does not explicitly teach that the entity is a data object.

Klein teaches transferring data from a bar code reader (bar code scanner) to a software application (host application providing container), including using a data object

Art Unit: 2126

(selection of data entry fields) to communicate data (data entered by scanning bar codes) and related data identification information (type of data entry – via keyboard or via scanner). See col. 4, lines 4-35; col. 5, lines 5-33. Given the teaching of Klein, it would have been obvious to use a data object to implement the entity of Herrod.

The motivation to combine the teachings of Herrod and Klein include the following. Herrod employs an architecture comprising implementation of a local bar code scanner resident on a control machine running a COM object / MS VB controls (col. 4, lines 1-6; col. 16, lines 1-14). Klein identifies the need to update such 'previous proposed' architecture to include the ability of remoting and provides a mechanism for the improvement (col. 2, lines 7-18; col. 6, lines 15-44). Therefore, one of ordinary skill in the art would have been motivated to use the mechanism of Klein to update the 'previous proposed' architecture of Herrod.

As to claims 2, 3, Herrod as modified teaches forming a data object (Herrod, VB implementation of scan-ware / customer control) (Klein, data collection object) [see discussion of claim 1]. Herrod teaches one or more forms (forms), one or more form objects / data selection criteria (multiple controls, .PRP file). See col. 5, lines 1-7, 57-63; col. 11, lines 15-16.

As to claim 7, Herrod teaches one or more input requestors (operator), each associated with a form (various custom properties used in configuration, col. 7, line 12 – col. 8, line 67).

As to claims 10, 11, Herrod teaches processing the data in the data object (input, retrieve, display). In Herrod, the processing details of the data object are not known the form object because such information is stored in the .PRP files and retrieved during run-time initialization.

As to claim 12, Herrod teaches transferring step is performed by an operating system (VB platform and underlying DOS).

As to claims 13, 16, Herrod teaches data exchange in local as well as remote fashions (col. 5, lines 1-3) and using component objects (controls/forms implemented in VB platform, col. 4, lines 1-21). It is noted that VB is a programming as well as an

Art Unit: 2126

execution platform/environment conforming to OLE/COM standard / data exchange mechanism.

As to claim 33, it is a system claim of claim 1 and thus note the discussion of claim 1. The memory writer, sender and matcher are inherent to the system of Herrod.

As to claims 34, 35, 39, 42-45 and 48, note the corresponding claims 2, 3, 7, 10-13, 16, respectively, for discussions.

4. Claims 4-6, 8, 9, 14, 15 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Claims 36-38, 40, 41, 46, 47 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

5. Applicant's arguments filed 1/21/2004 have been fully considered but they are not persuasive.

Regarding claim 1, applicant argued that (1) Herrod does not teach storing the information in an entity that is a data object (remarks, page 13, last paragraph), (2) Herrod does not teach receiving data from a bar code reader and storing the information in an entity along with an identification of the bar code reader. (remarks, page 13, last paragraph).

The examiner's position is as follows. As to (1), Herrod is not relied on to teach implementing the entity with a data object, which is met by Klein meets the data object (data collection object). Note the discussion of claim 1 for a detailed discussion, (3) the examiner states the use of VB teaches the data object (remarks, page 14, lines 1-5).

As to (2), Herrod teaches receiving data (scanned data) from a bar code reader (bar code scanning module 8) and storing the information (scanned data) in an entity (scan-aware customer control 32) along with an identification of the bar code reader (property SOURCE_SCANNER, which identifies the bar code reader as the data input source) in that the property SOURCE SCANNER, which is an .Action property, is

Art Unit: 2126

stored as part of the control 32 itself. See col. 11, line 50 - col. 12, line 30, lines 56-64; col. 13, lines 33-37. The .Action property is used by the application to identify/determine the source of the data in the field of the control. The office action mailed 9/3/2003 provided the detailed analysis as to how the elements and passages of Herrod meet recited above meet the claimed limitation. In the response filed 1/21/2004, applicant did not provide any specific/underlying analysis as to why the portions of Herrod relied on by the examiner do not support the examiner's position.

As to the argument that the office action mailed 9/3/2003 relied on VB language to meet the data object as claimed, the office action mailed 9/3/2003 did not rely on VB language to meet the data object as claimed. Note the rejection of claim 1.

Applicant further argued that in Herrod, there is no need to identify which device provided the input because the object was set to receive input from only one device, whereas in claim 1 the method may receive input from another device besides the bar code reader / allow more than one device to provide input to a field. (Remarks, page 14, 1st paragraph).

The examiner respectfully disagrees. Contrary to applicant's characterization, for each data field Herrod allows at least two possible sources of input, the scanned data and the keyed entry, alone or in combination. See Herrod, col. 6, lines 9-64; and col. 16, lines 15-26. Therefore, there is need in Herrod to identify which device provides the input. It is noted that claim 1 does not require receiving input from another device besides the bar code reader, nor allowing more than one device to provide input to a field. See entire claim 1.

Applicant further argued that Klein does not teach storing the identification of the object. (remarks, page 14, 2nd paragraph). The examiner respectfully disagrees. As discussed in the rejection of claim 1, Klein teaches transferring data from a bar code reader (bar code scanner) to a software application (host application providing container), including using a data object (selection of data entry fields) to communicate data (data entered by scanning bar codes) and related data identification information (type of data entry – via keyboard or via scanner). See col. 4, lines 4-25. The data entry fields, associated with the data collection object, contains the data entered by scanning

Art Unit: 2126

bar codes as well as the identification information identifying that the data is entered via a scanner (vs. via a keyboard as the alternative), therefore, meeting the data object as claimed. It is noted that one of ordinary skill in this art would recognize that an object is an entity and a data object is an entity that contains data.

In response to applicant's argument that the examiner's conclusion of obviousness is based upon improper hindsight reasoning (remarks, page 15, 1st para.). it must be recognized that any judgement on obviousness is in a sense necessarily a reconstruction based upon hindsight reasoning. But so long as it takes into account only knowledge which was within the level of ordinary skill at the time the claimed invention was made, and does not include knowledge gleaned only from the applicant's disclosure, such a reconstruction is proper. In re McLaughlin, 443 F.2d 1392; 170 USPQ 209 (CCPA 1971). In this case, Herrod employs an architecture comprising implementation of a local bar code scanner resident on a control machine running a COM object / MS VB controls (col. 4, lines 1-6; col. 16, lines 1-14). Klein identifies the need to update such 'previous proposed' architecture to include the ability of remoting and provides a mechanism for the improvement (col. 2, lines 7-18; col. 6, lines 15-44). Therefore, one of ordinary skill in the art would be motivated to use the mechanism of Klein to update the 'previous proposed' architecture of Herrod. Further, it is the teachings of Herrod and of Klein (communicating data from a bar code reader to a software application), rather than the environments that the respective teachings are applied (non-distributed processing environment, distributed processing environment), that are combined.

6. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for response to this final action is set to expire THREE MONTHS from the date of this action. In the event a first response is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and

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Art Unit: 2126

any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event will the statutory period for response expire later than SIX MONTHS from the date of this final action.

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Sue Lao whose telephone number is (703) 305-9657. A voice mail service is also available at this number. The examiner's supervisor, SPE Meng-Ai An, can be reached on (703) 305-9678. The examiner can normally be reached on Monday - Friday, from 9AM to 5PM. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 305-9600.

Sue Lao

April 2, 2004

Page 7